

FCC Appendix RF Test Data for BT

FCC ID : 2BUP7-D20B

Company : Shenzhen Hongyu Health Technology Co., Ltd.

EUT : Bone Conduction Hearing Amplifier

Model Number : D20B

Report No. : CTA25102200302

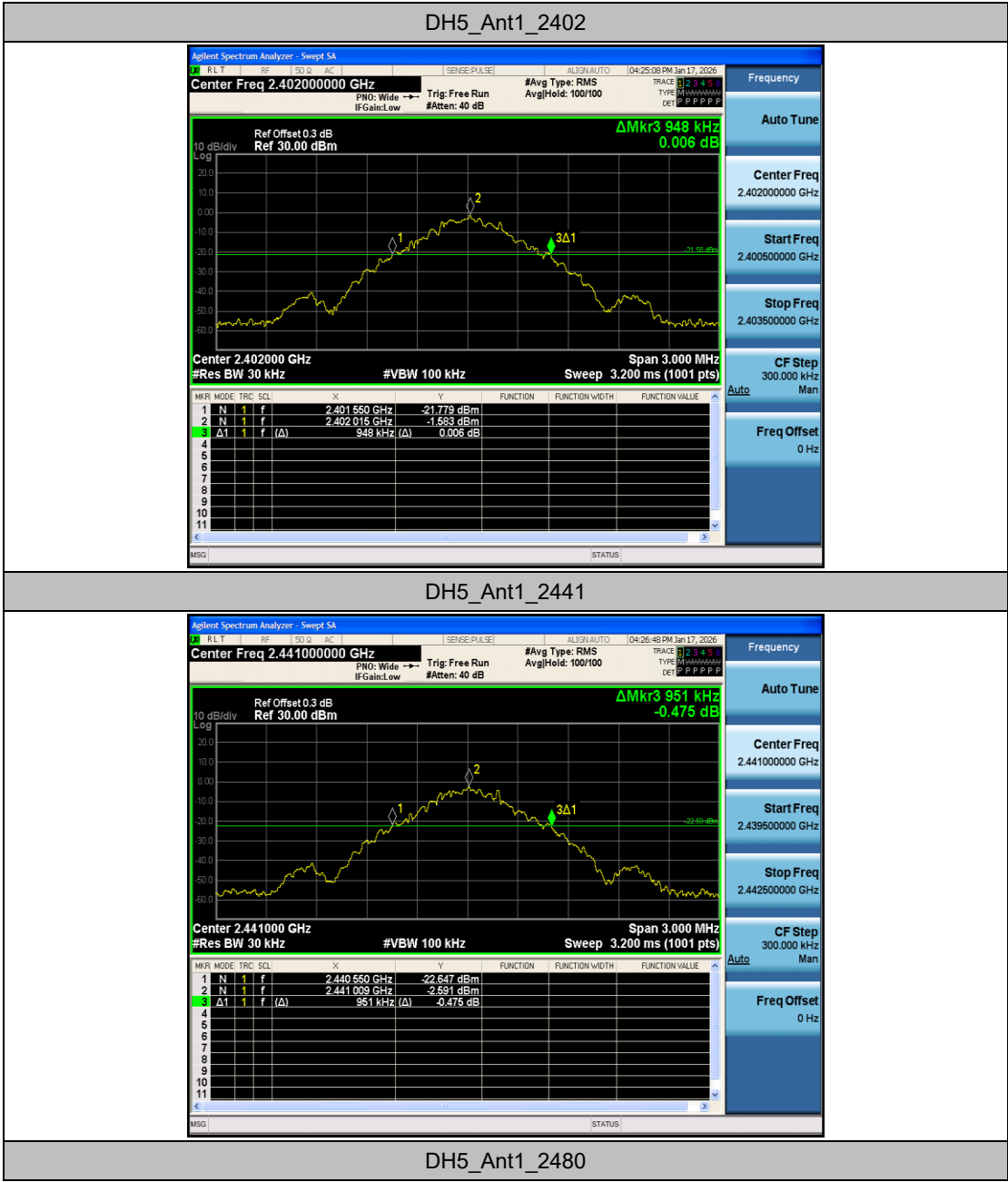
Reviewed By : Eric Wang

Appendix A: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	20dB EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.948	2401.550	2402.498	---	---
		2441	0.951	2440.550	2441.501	---	---
		2480	0.954	2479.547	2480.501	---	---
2DH5	Ant1	2402	1.290	2401.376	2402.666	---	---
		2441	1.287	2440.379	2441.666	---	---
		2480	1.314	2479.352	2480.666	---	---
3DH5	Ant1	2402	1.314	2401.352	2402.666	---	---
		2441	1.284	2440.379	2441.663	---	---
		2480	1.335	2479.343	2480.678	---	---

Test Graphs





2DH5_Ant1_2402



2DH5_Ant1_2441



2DH5_Ant1_2480



3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



Appendix B: Occupied Channel Bandwidth

Test Result

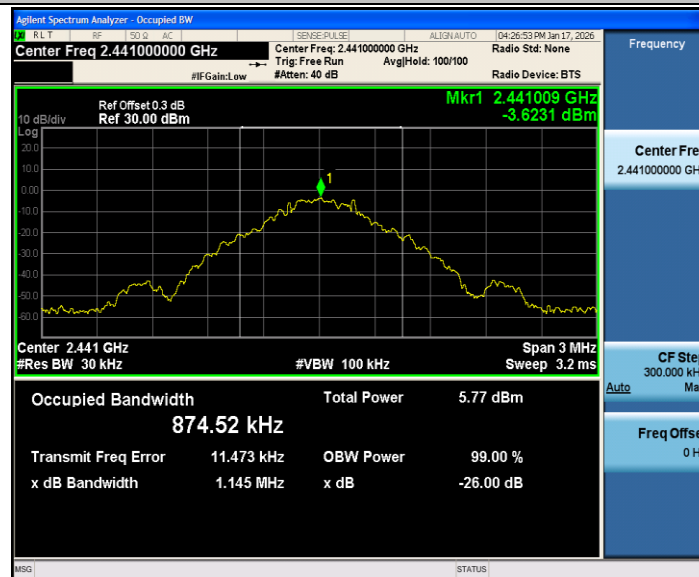
TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.85430	2401.5836	2402.4379	---	---
		2441	0.87452	2440.5742	2441.4487	---	---
		2480	0.86556	2479.5797	2480.4453	---	---
2DH5	Ant1	2402	1.1874	2401.4160	2402.6034	---	---
		2441	1.1982	2440.4116	2441.6098	---	---
		2480	1.1950	2479.4150	2480.6100	---	---
3DH5	Ant1	2402	1.1908	2401.4127	2402.6035	---	---
		2441	1.1955	2440.4132	2441.6087	---	---
		2480	1.1944	2479.4133	2480.6077	---	---

Test Graphs

DH5_Ant1_2402



DH5_Ant1_2441



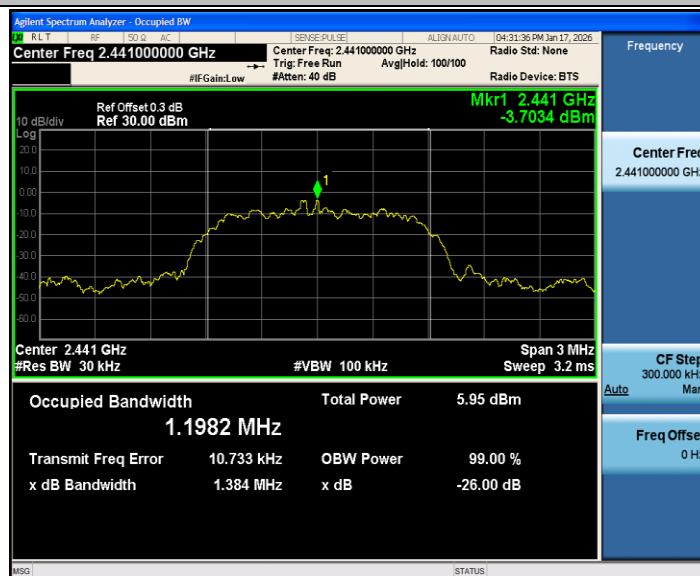
DH5_Ant1_2480



2DH5_Ant1_2402



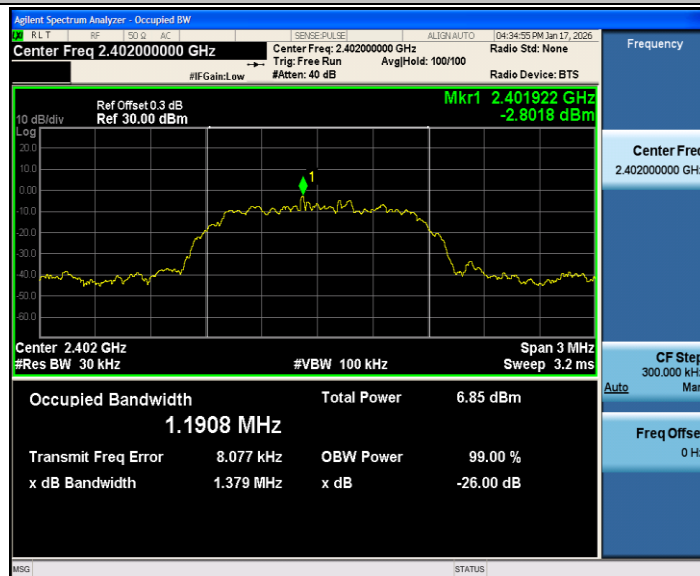
2DH5_Ant1_2441



2DH5_Ant1_2480



3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



Appendix C: Maximum conducted output power

Test Result Peak

Test Mode	Antenna	Freq(MHz)	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH5	Ant1	2402	0.16	≤20.97	PASS
		2441	-0.61	≤20.97	PASS
		2480	-0.93	≤20.97	PASS
2DH5	Ant1	2402	2.80	≤20.97	PASS
		2441	1.97	≤20.97	PASS
		2480	1.66	≤20.97	PASS
3DH5	Ant1	2402	2.84	≤20.97	PASS
		2441	1.97	≤20.97	PASS
		2480	1.67	≤20.97	PASS

Appendix D: Carrier frequency separation

Test Result

TestMode	Antenna	Freq(MHz)	Result[MHz]	Limit[MHz]	Verdict
DH5	Ant1	Hop	0.984	≥ 0.954	PASS
2DH5	Ant1	Hop	1.11	≥ 0.876	PASS
3DH5	Ant1	Hop	0.96	≥ 0.890	PASS

Test Graphs



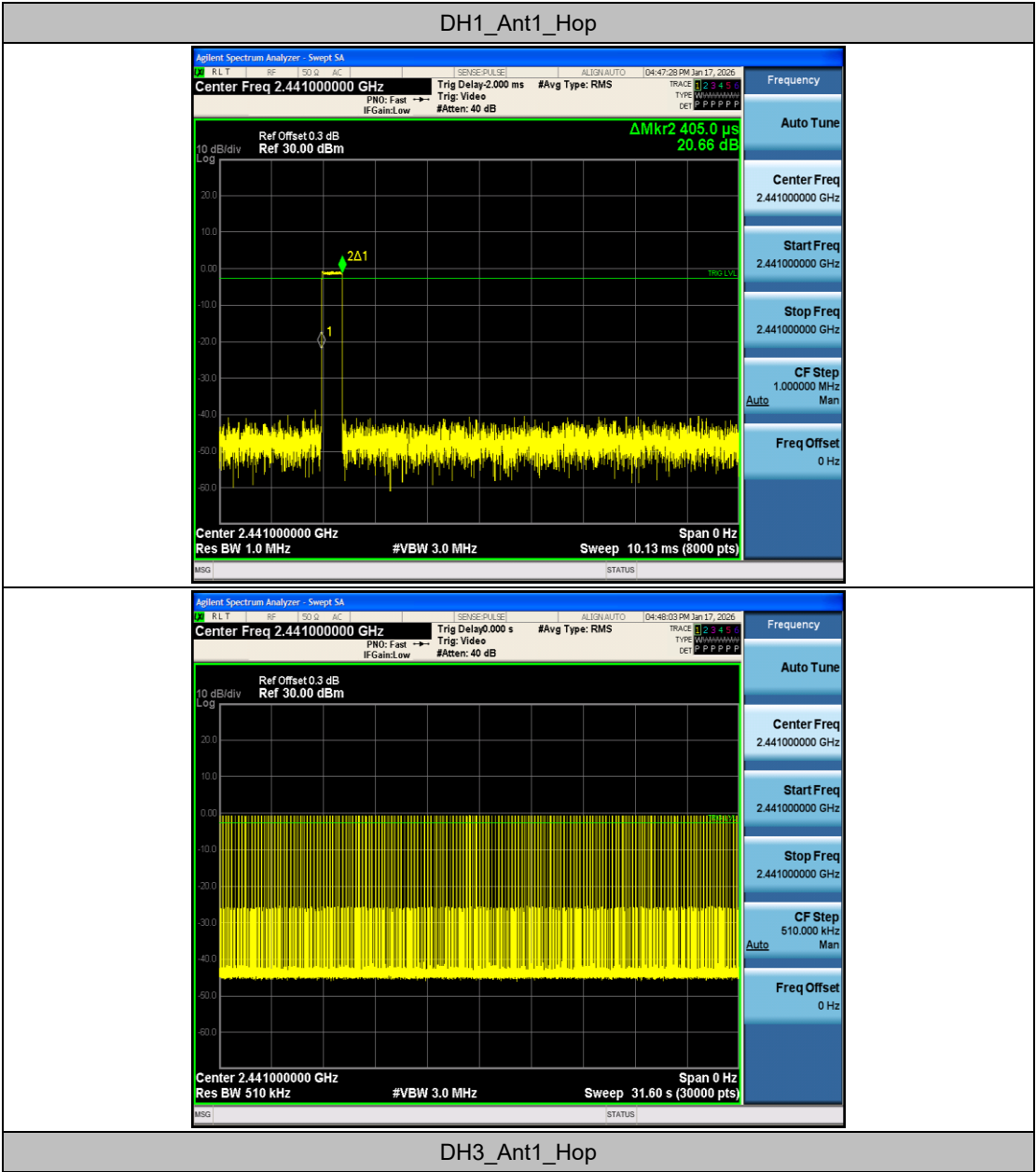


Appendix E: Time of occupancy

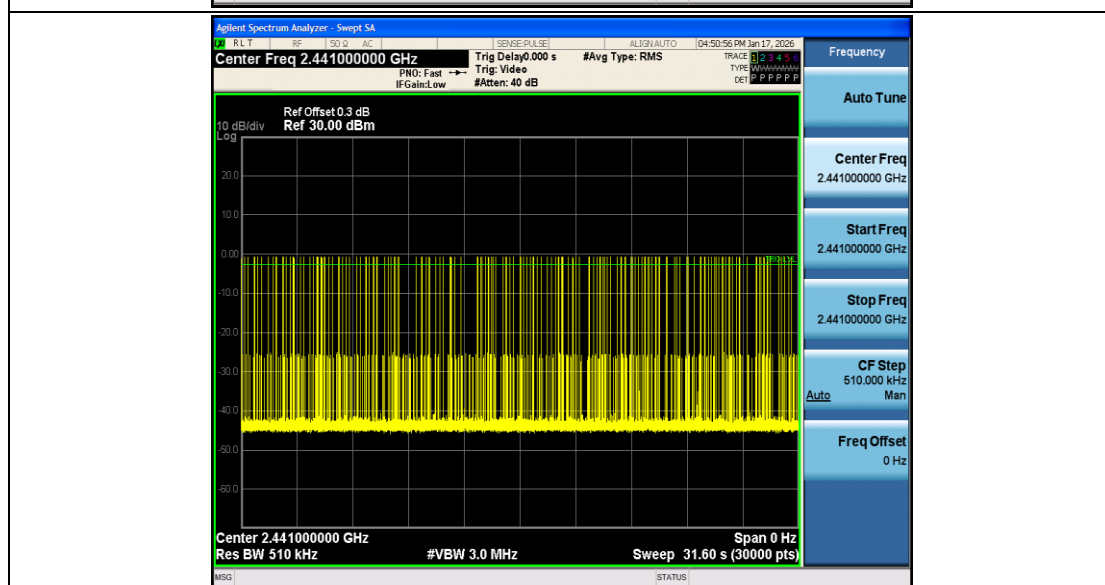
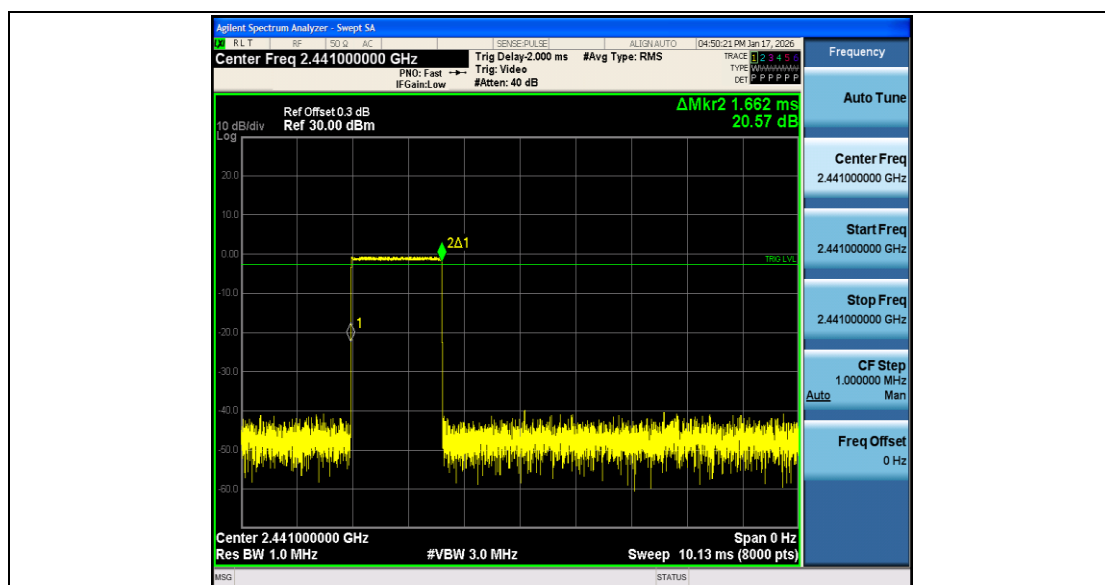
Test Result

TestMode	Antenna	Freq(MHz)	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.405	318	0.129	≤0.4	PASS
DH3	Ant1	Hop	1.662	166	0.276	≤0.4	PASS
DH5	Ant1	Hop	2.911	107	0.311	≤0.4	PASS
2DH1	Ant1	Hop	0.405	318	0.129	≤0.4	PASS
2DH3	Ant1	Hop	1.662	166	0.276	≤0.4	PASS
2DH5	Ant1	Hop	2.915	113	0.329	≤0.4	PASS
3DH1	Ant1	Hop	0.405	319	0.129	≤0.4	PASS
3DH3	Ant1	Hop	1.662	153	0.254	≤0.4	PASS
3DH5	Ant1	Hop	2.915	102	0.297	≤0.4	PASS

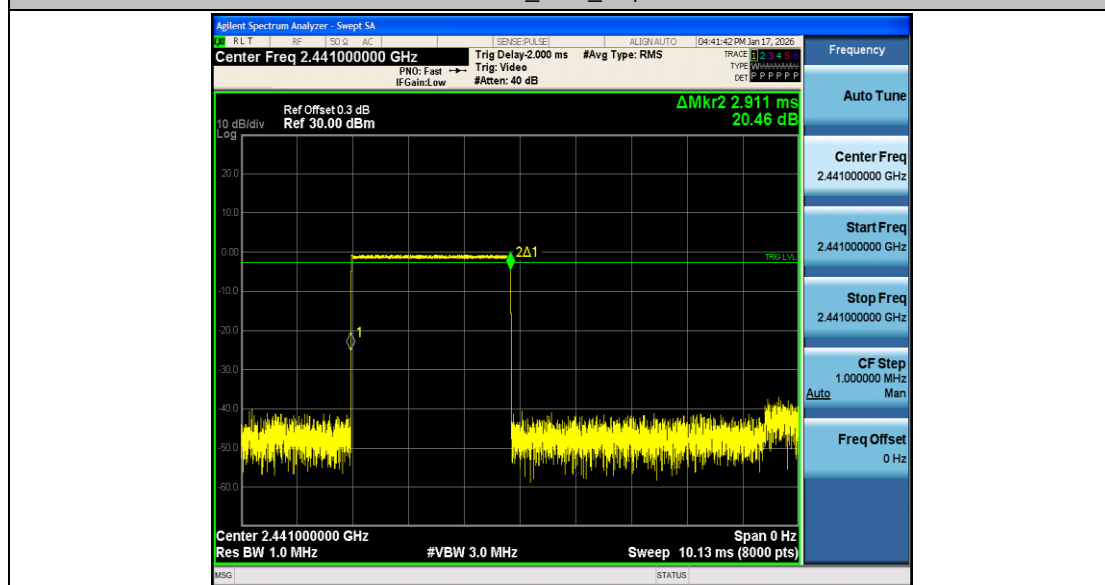
Test Graphs

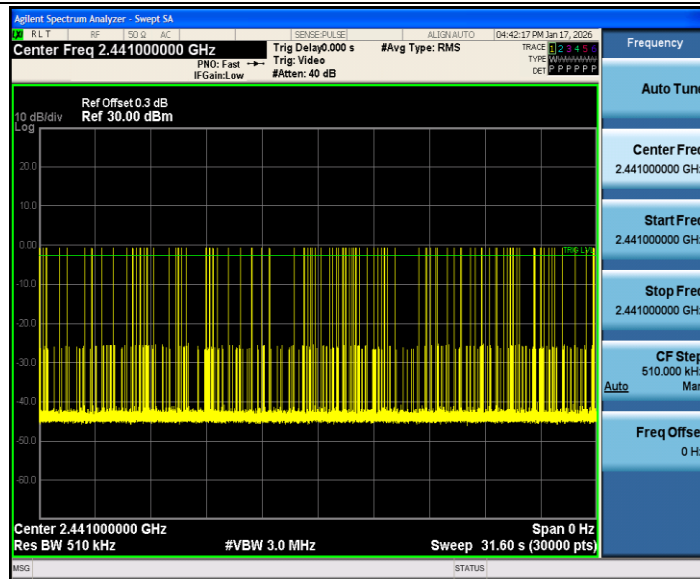


DH3_Ant1_Hop

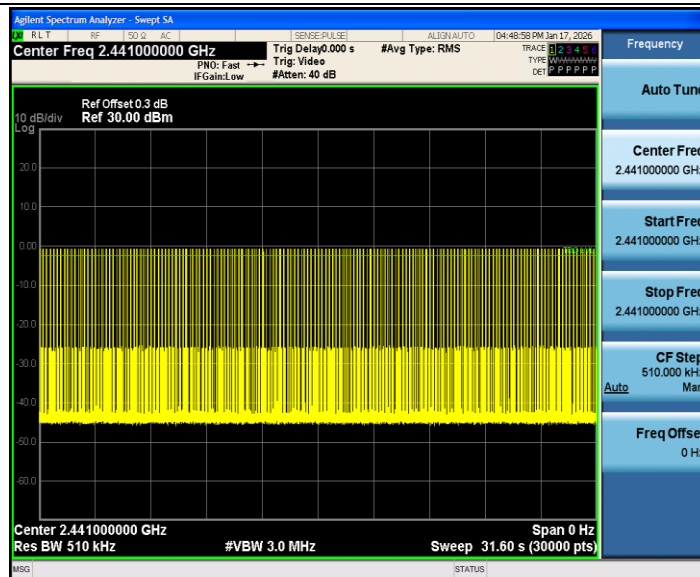
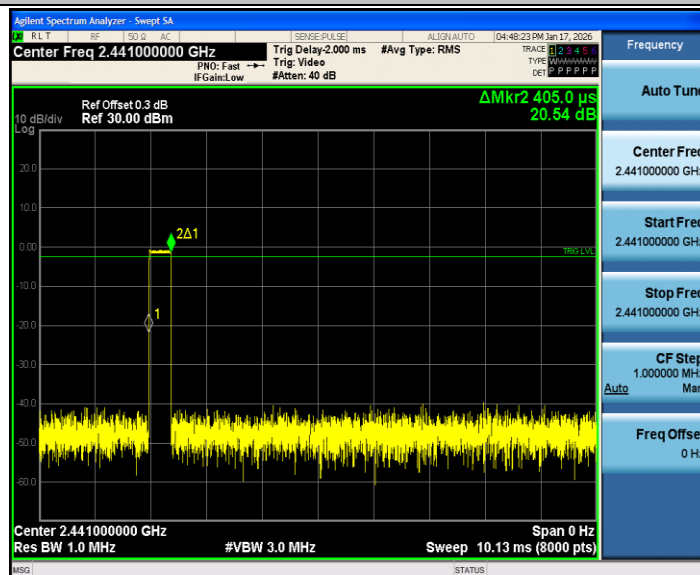


DH5_Ant1_Hop

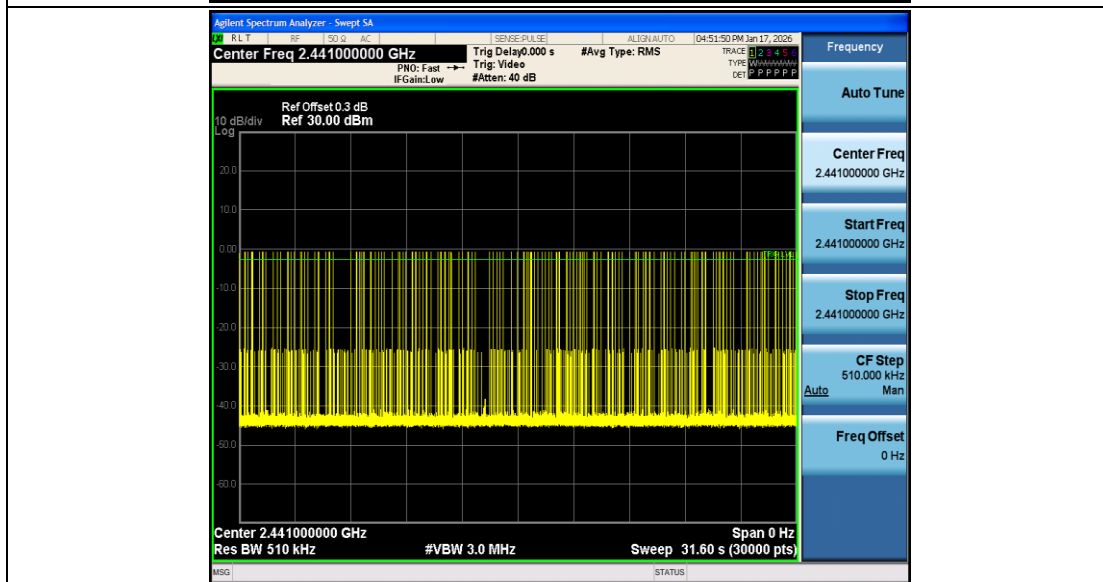
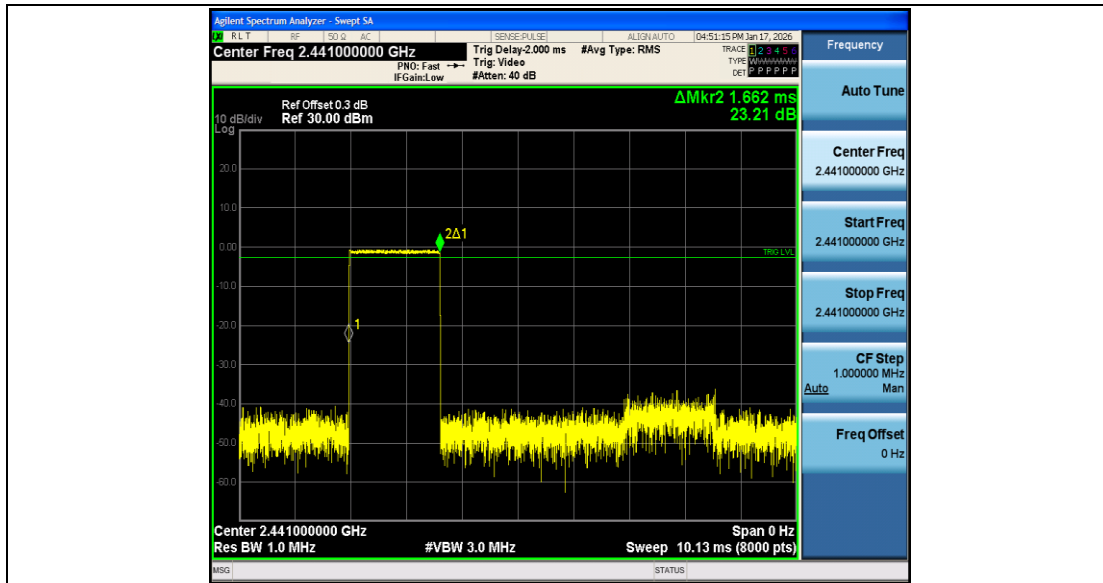




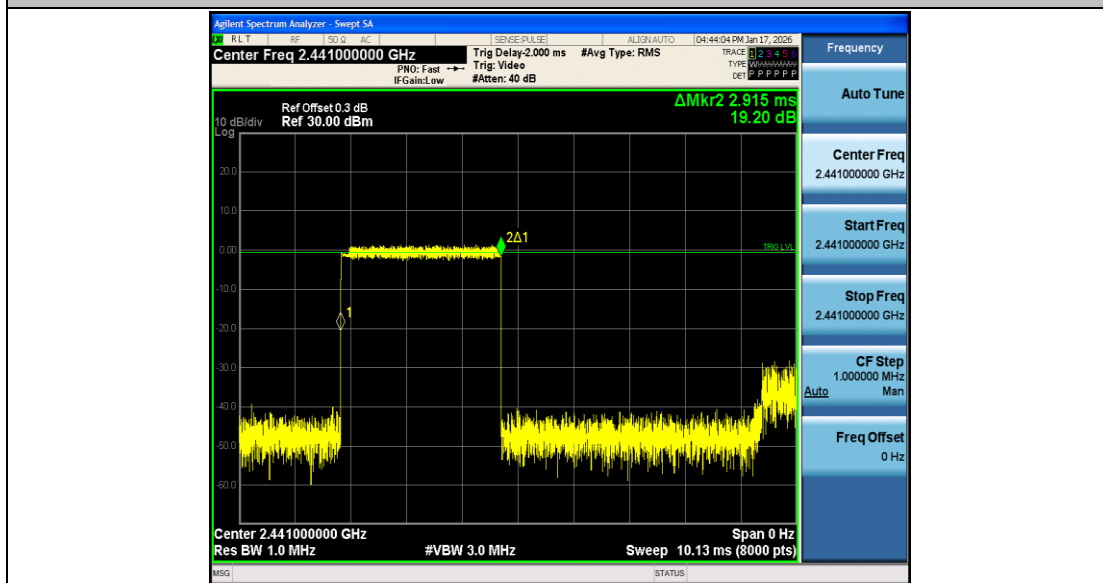
2DH1_Ant1_Hop

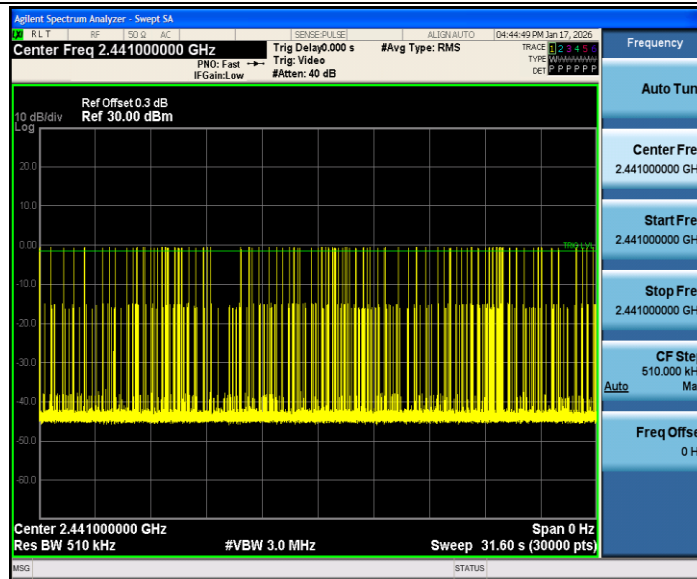


2DH3_Ant1_Hop

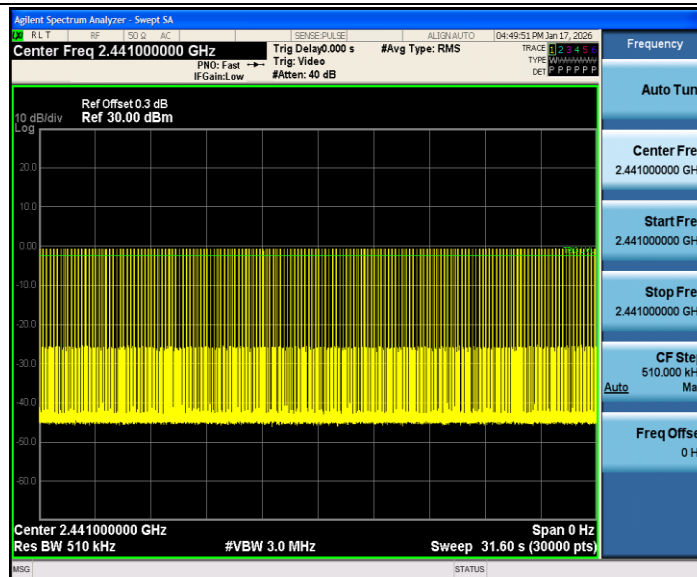
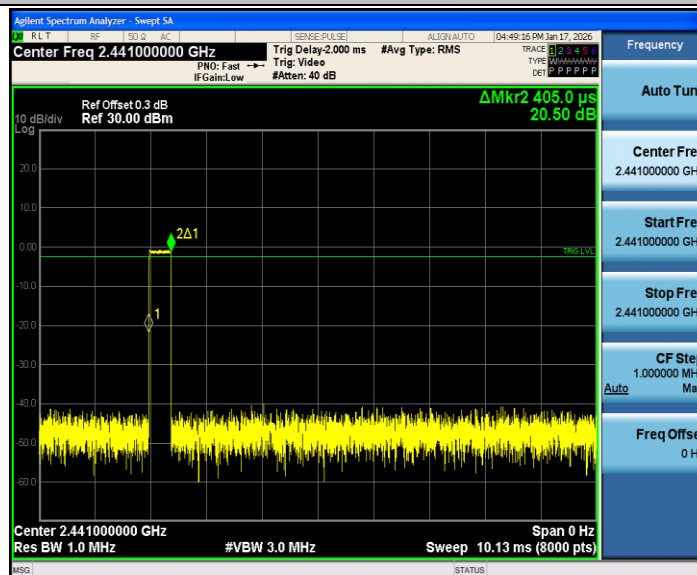


2DH5_Ant1_Hop

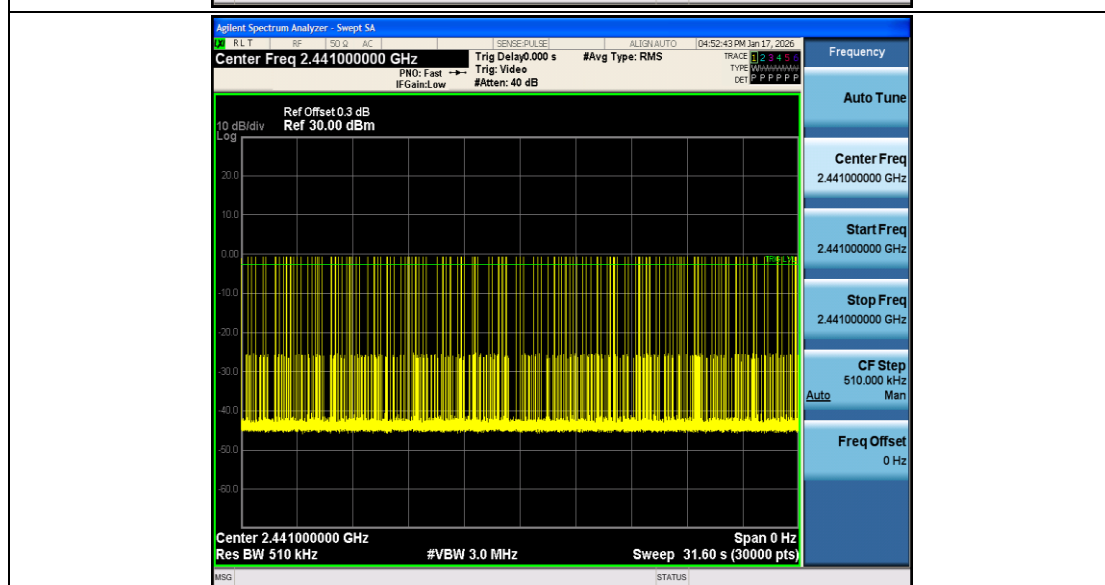
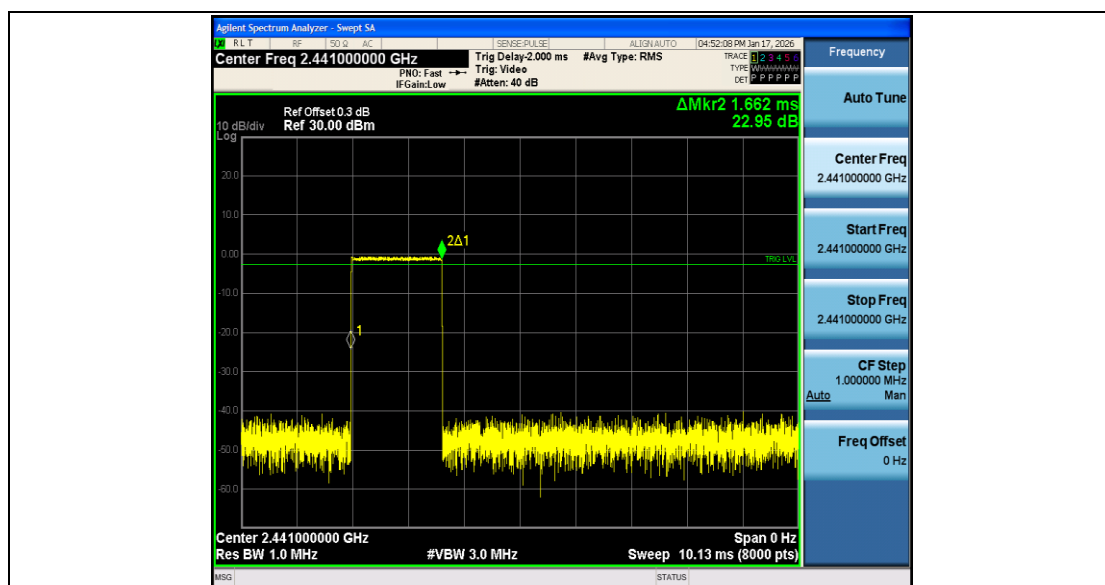




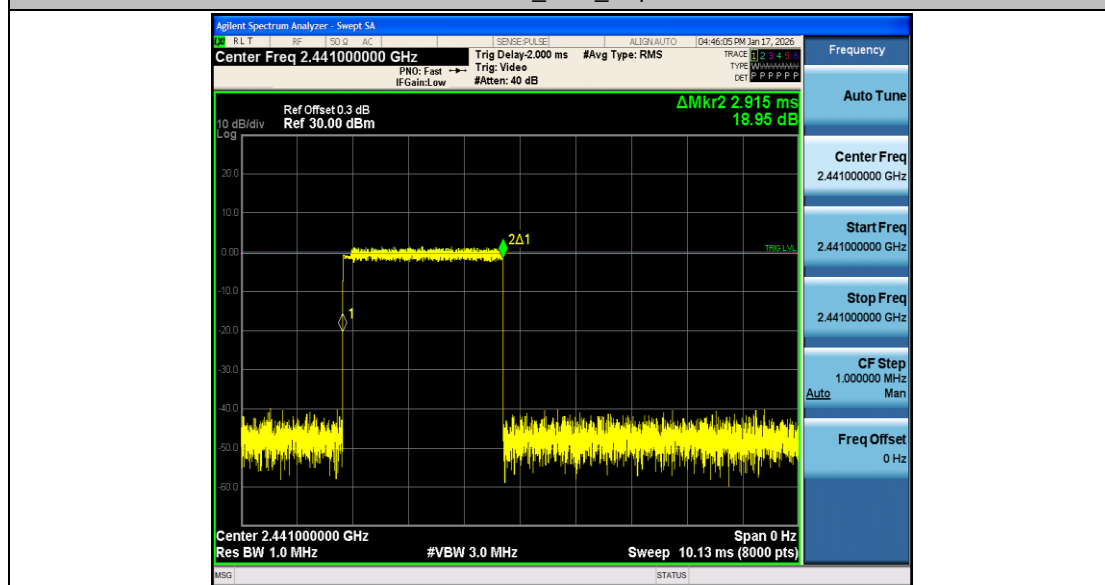
3DH1_Ant1_Hop

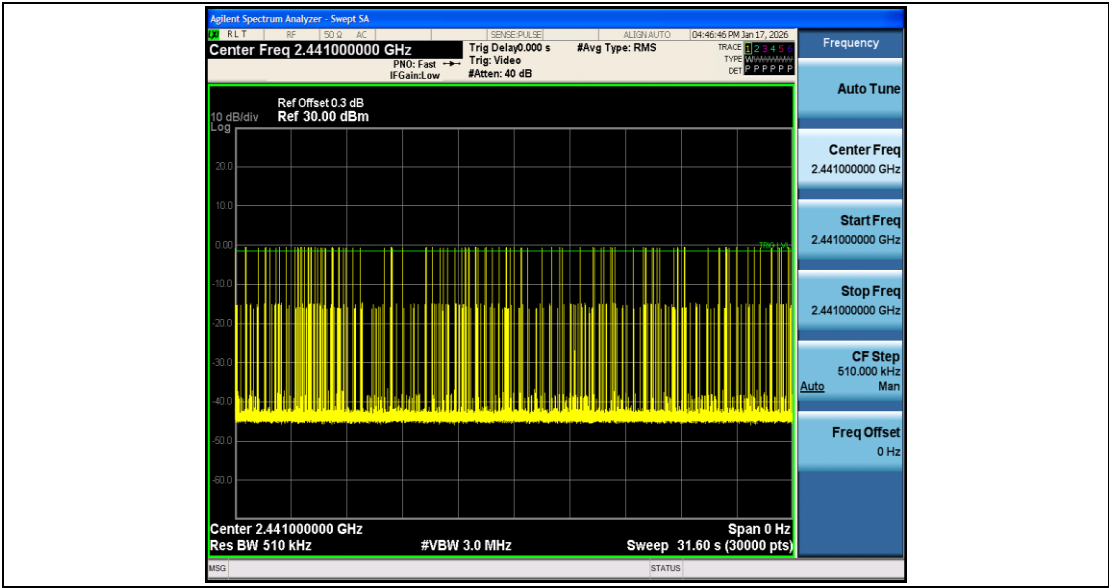


3DH3_Ant1_Hop



3DH5_Ant1_Hop



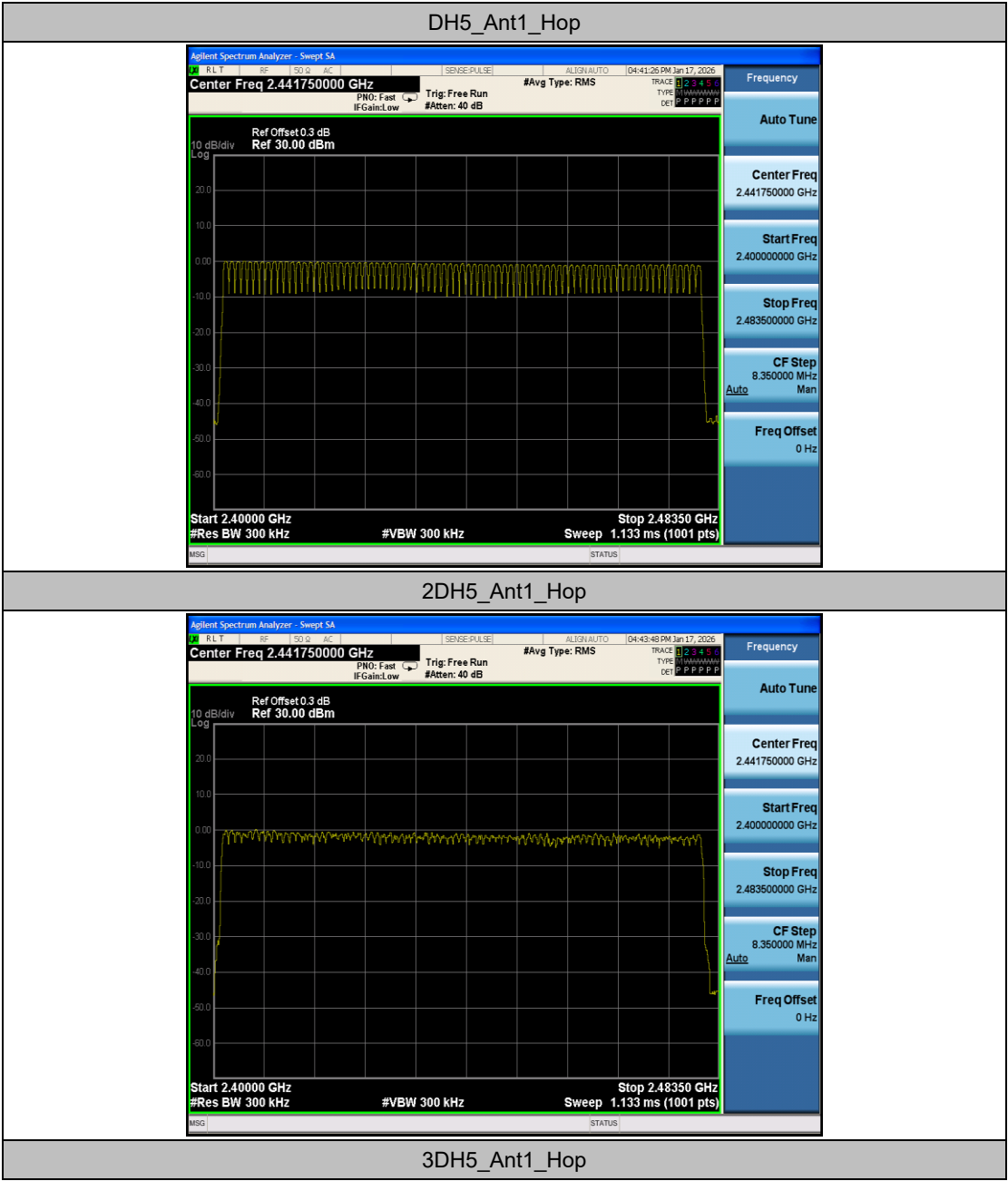


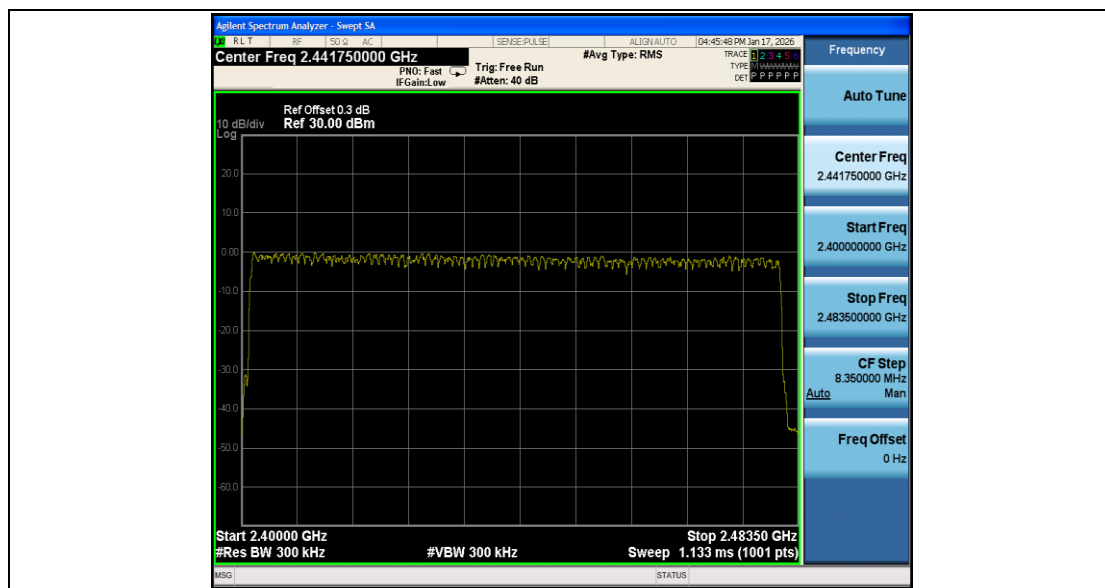
Appendix F: Number of hopping channels

Test Result

TestMode	Antenna	Freq(MHz)	Result[Num]	Limit[Num]	Verdict
DH5	Ant1	Hop	79	≥15	PASS
2DH5	Ant1	Hop	79	≥15	PASS
3DH5	Ant1	Hop	79	≥15	PASS

Test Graphs



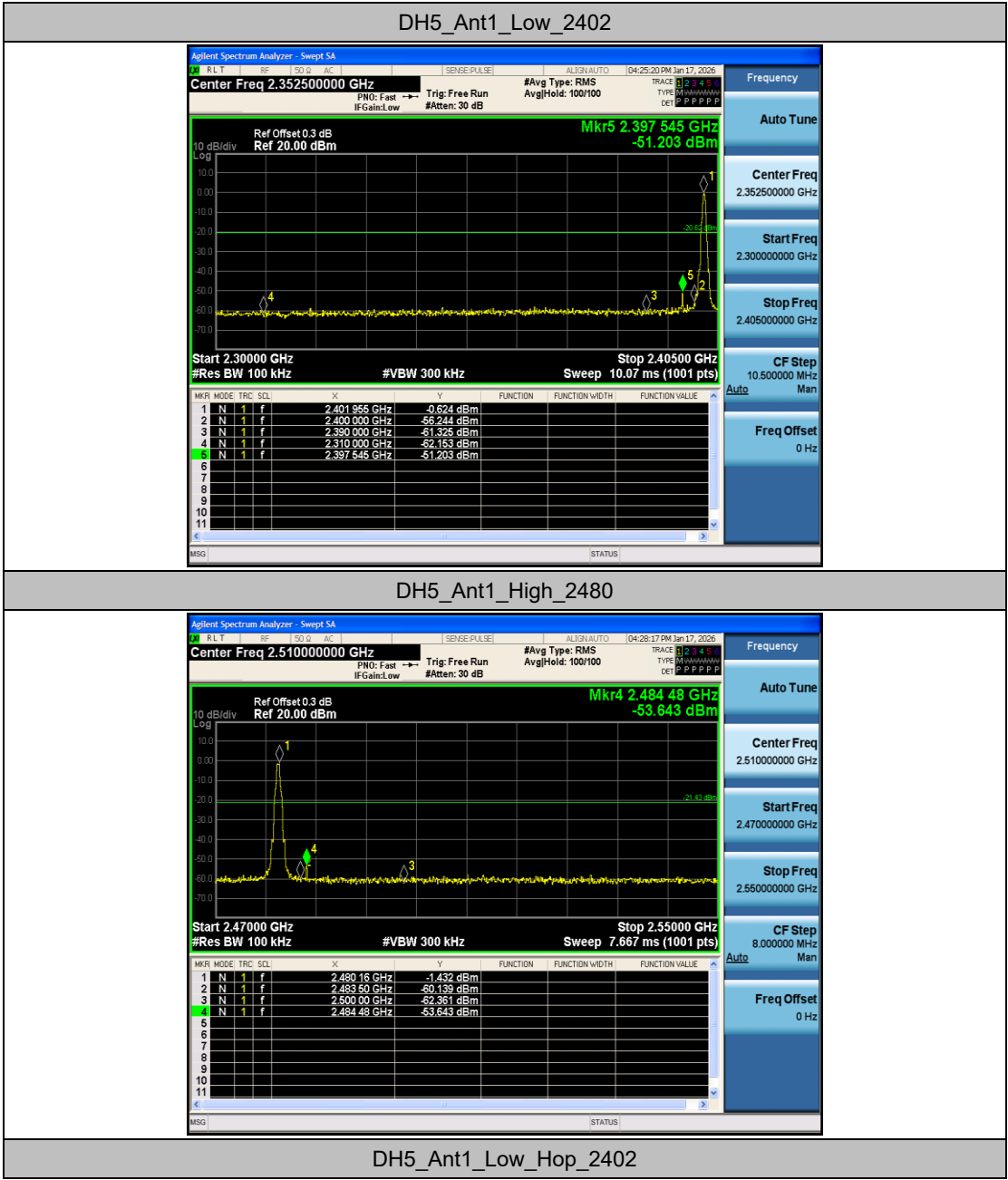


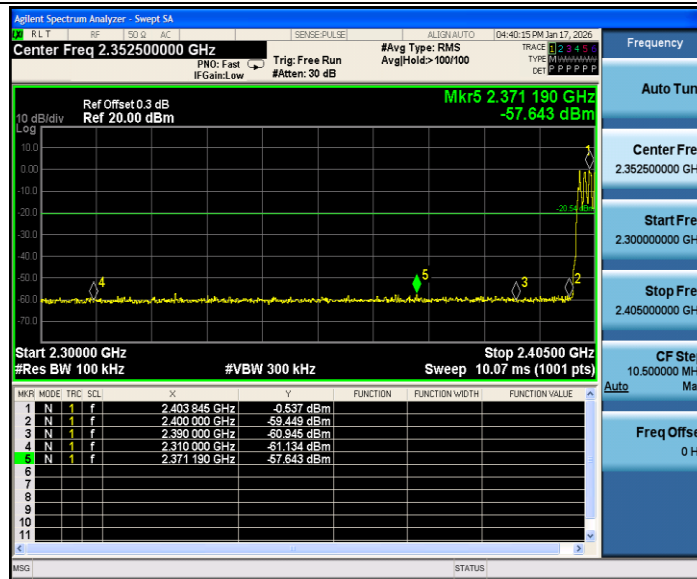
Appendix G: Band edge measurements

Test Result

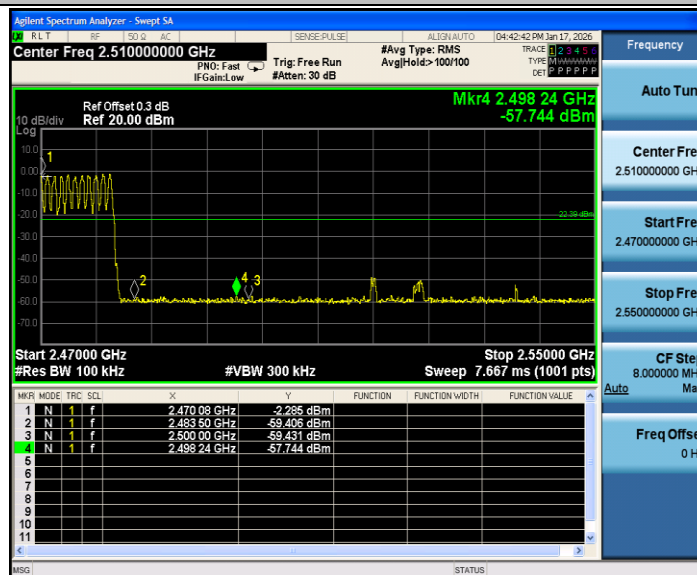
TestMode	Antenna	ChName	Freq(MHz)	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	-0.62	-51.2	≤-20.62	PASS
		High	2480	-1.43	-53.64	≤-21.43	PASS
		Low	Hop_2402	-0.54	-57.64	≤-20.54	PASS
		High	Hop_2480	-2.39	-57.74	≤-22.39	PASS
2DH5	Ant1	Low	2402	-0.60	-50.45	≤-20.6	PASS
		High	2480	-2.05	-57.17	≤-22.05	PASS
		Low	Hop_2402	-2.83	-51.54	≤-22.83	PASS
		High	Hop_2480	-1.67	-56.27	≤-21.67	PASS
3DH5	Ant1	Low	2402	-0.16	-51.65	≤-20.16	PASS
		High	2480	-2.09	-47.69	≤-22.09	PASS
		Low	Hop_2402	-1.18	-49.74	≤-21.18	PASS
		High	Hop_2480	-2.02	-55.72	≤-22.02	PASS

Test Graphs

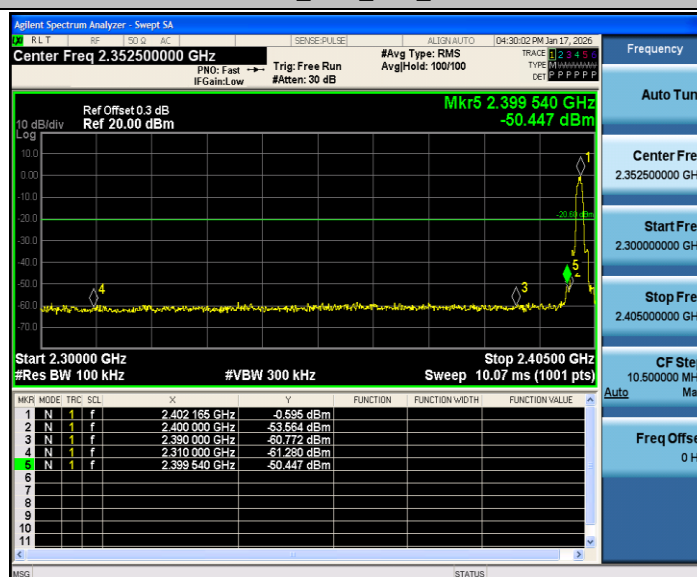




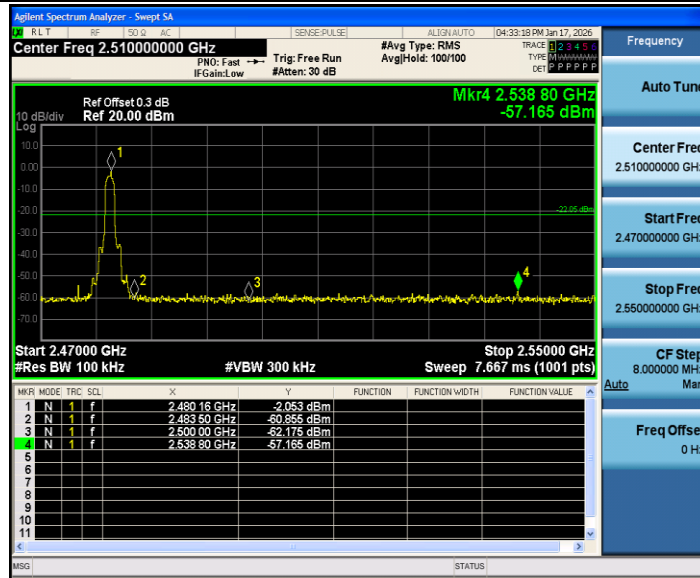
DH5_Ant1_High_Hop_2480



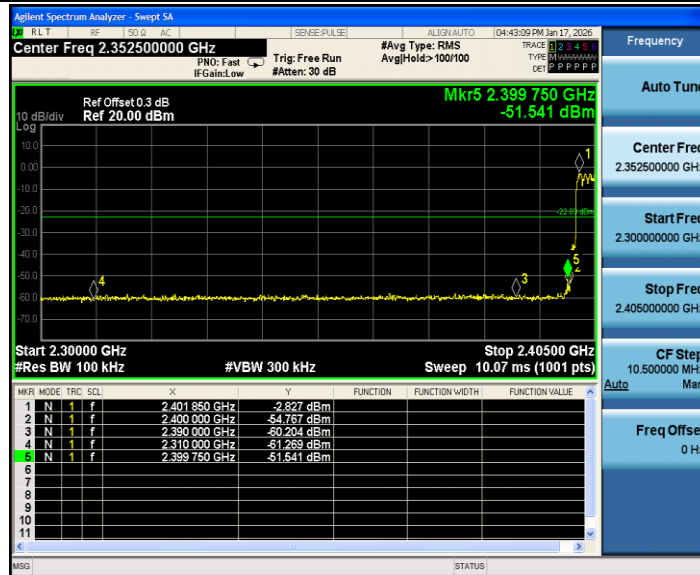
2DH5_Ant1_Low_2402



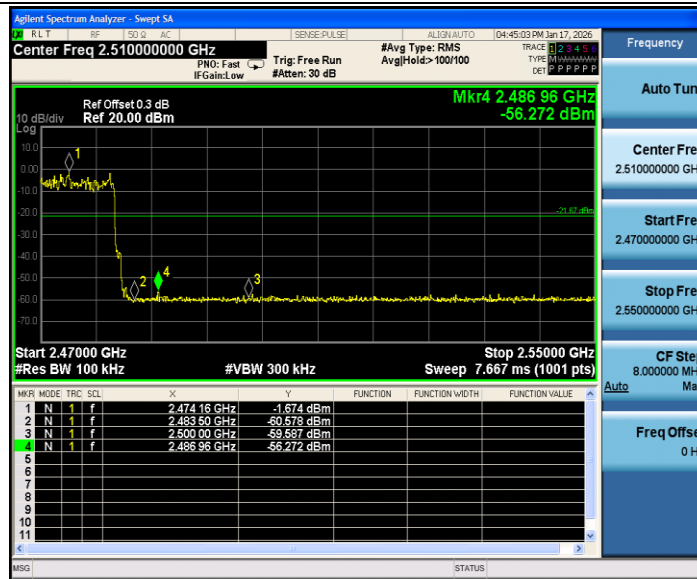
2DH5_Ant1_High_2480



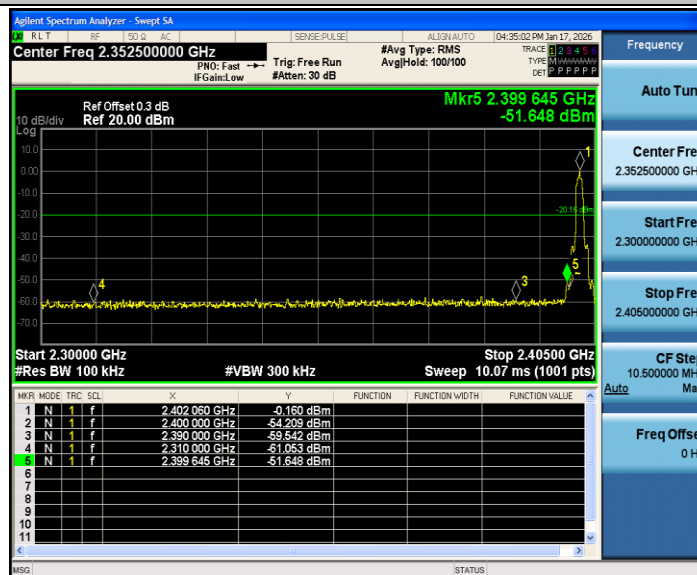
2DH5_Ant1_Low_Hop_2402



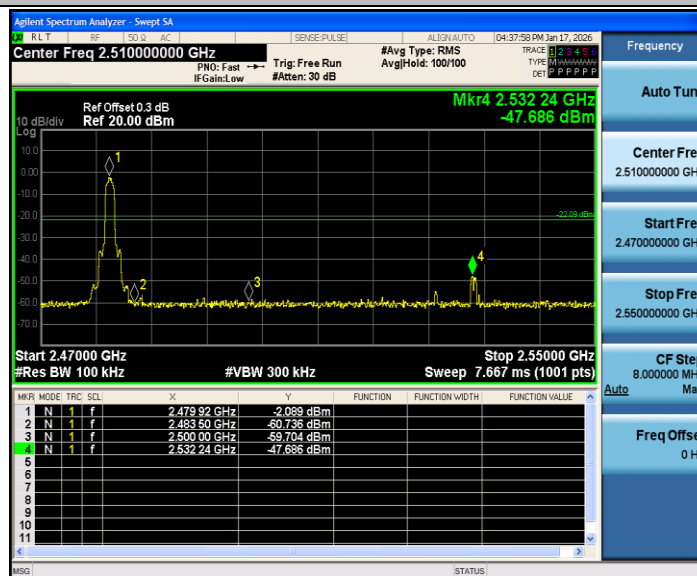
2DH5_Ant1_High_Hop_2480



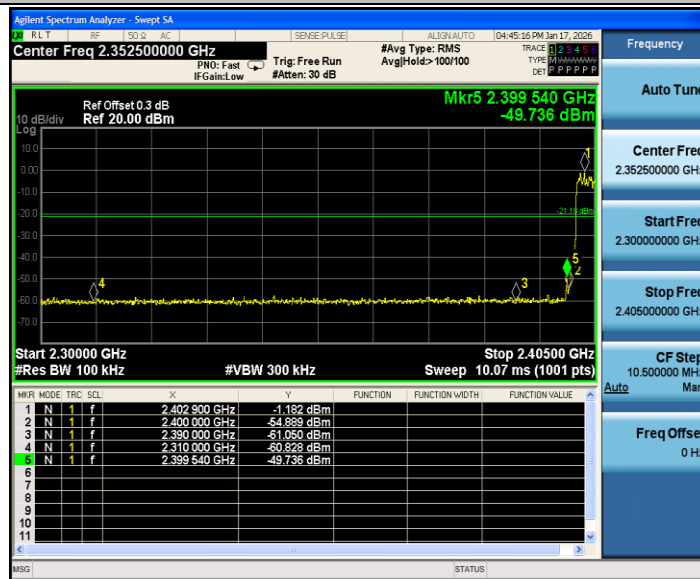
3DH5_Ant1_Low_2402



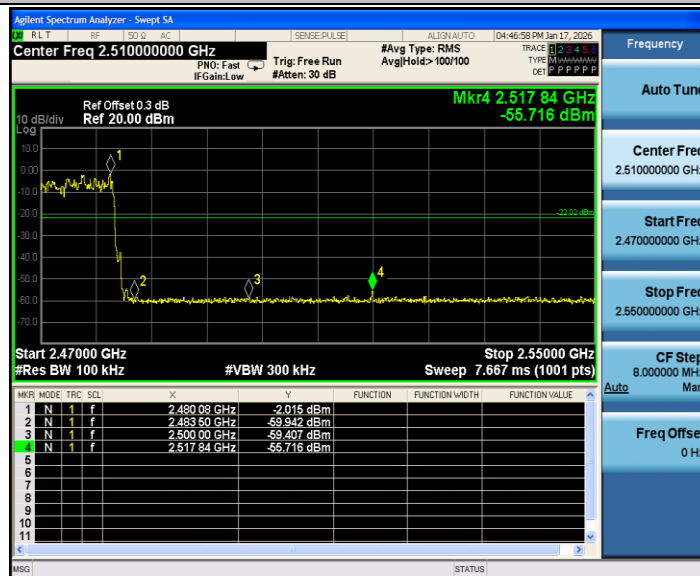
3DH5_Ant1_High_2480



3DH5_Ant1_Low_Hop_2402



3DH5_Ant1_High_Hop_2480

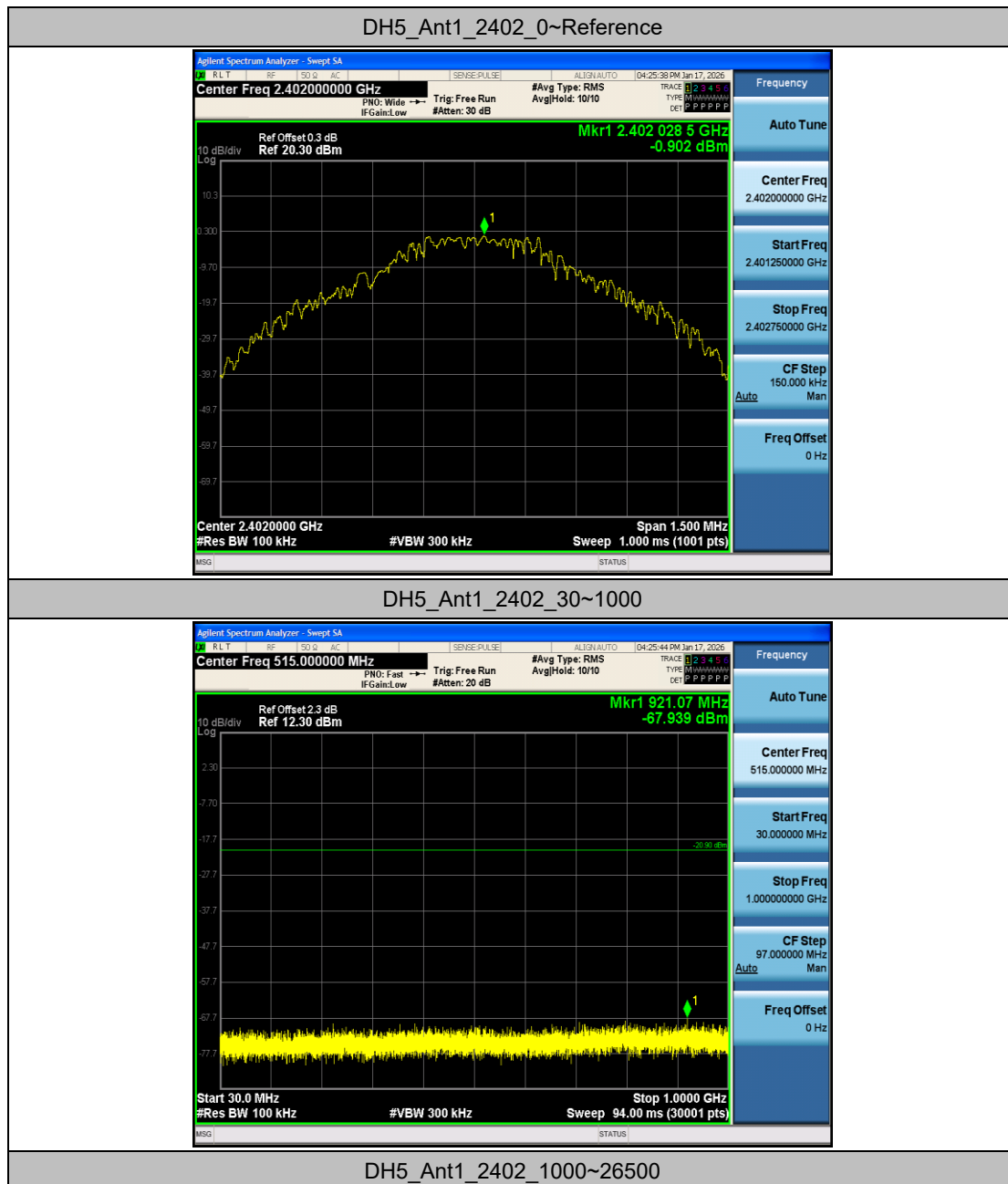


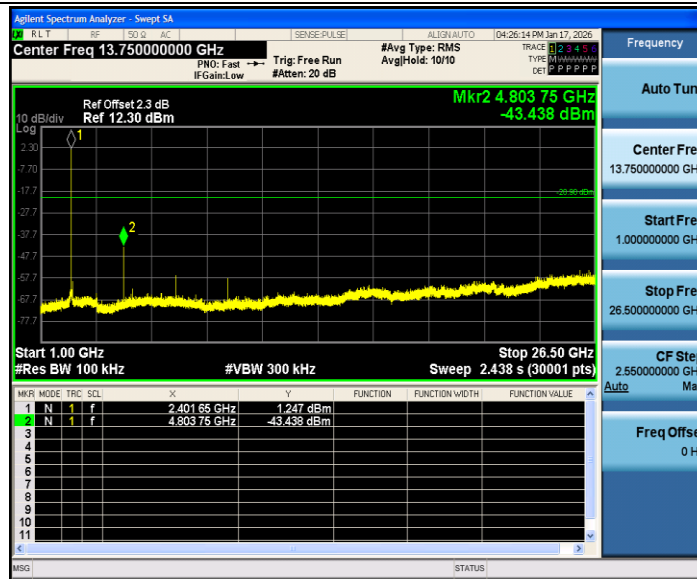
Appendix H: Conducted Spurious Emission

Test Result

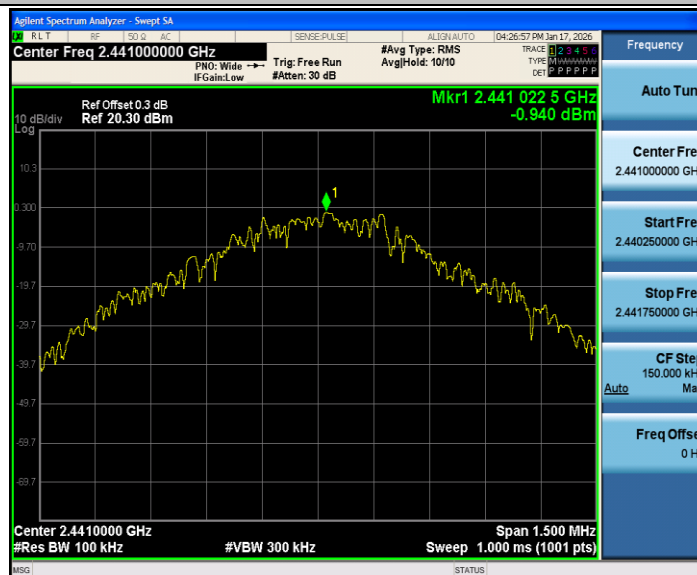
TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	Reference	-0.90	-0.90	---	PASS
			30~1000	-0.90	-67.94	≤-20.9	PASS
			1000~26500	-0.90	-43.44	≤-20.9	PASS
		2441	Reference	-0.94	-0.94	---	PASS
			30~1000	-0.94	-68.17	≤-20.94	PASS
			1000~26500	-0.94	-45.5	≤-20.94	PASS
		2480	Reference	-1.73	-1.73	---	PASS
			30~1000	-1.73	-66.78	≤-21.73	PASS
			1000~26500	-1.73	-42.06	≤-21.73	PASS
2DH5	Ant1	2402	Reference	-3.37	-3.37	---	PASS
			30~1000	-3.37	-68.67	≤-23.37	PASS
			1000~26500	-3.37	-44.68	≤-23.37	PASS
		2441	Reference	-1.46	-1.46	---	PASS
			30~1000	-1.46	-67.72	≤-21.46	PASS
			1000~26500	-1.46	-43.25	≤-21.46	PASS
		2480	Reference	-2.14	-2.14	---	PASS
			30~1000	-2.14	-68.39	≤-22.14	PASS
			1000~26500	-2.14	-44.71	≤-22.14	PASS
3DH5	Ant1	2402	Reference	-1.81	-1.81	---	PASS
			30~1000	-1.81	-68.46	≤-21.81	PASS
			1000~26500	-1.81	-46.43	≤-21.81	PASS
		2441	Reference	-1.37	-1.37	---	PASS
			30~1000	-1.37	-68.18	≤-21.37	PASS
			1000~26500	-1.37	-46.14	≤-21.37	PASS
		2480	Reference	-2.47	-2.47	---	PASS
			30~1000	-2.47	-68.38	≤-22.47	PASS
			1000~26500	-2.47	-46.36	≤-22.47	PASS

Test Graphs

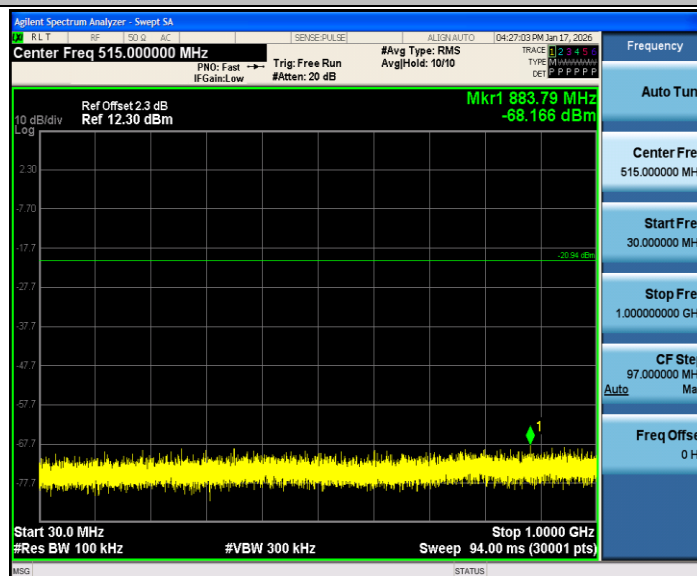




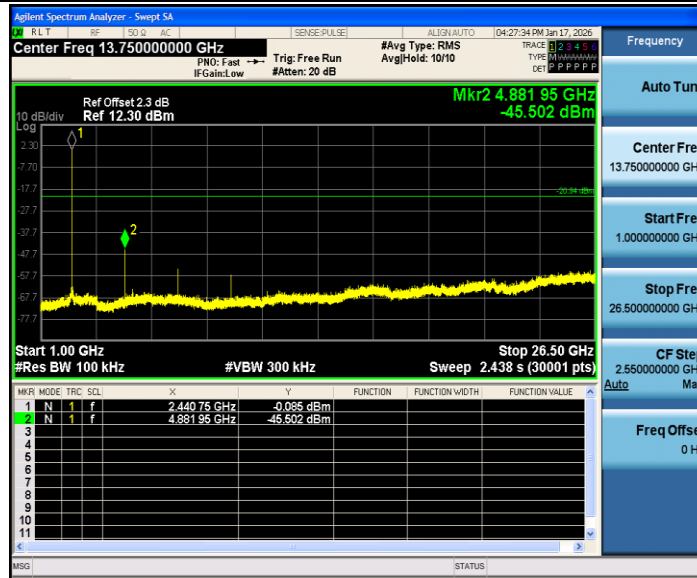
DH5_Ant1_2441_0~Reference



DH5_Ant1_2441_30~1000



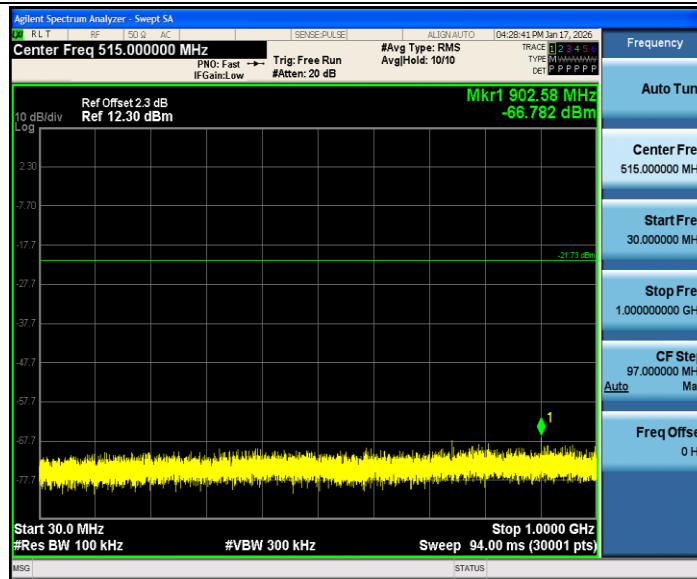
DH5_Ant1_2441_1000~26500



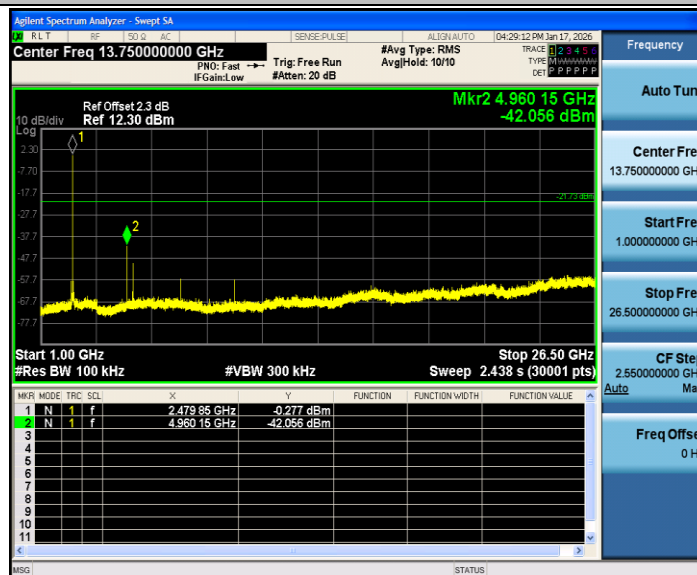
DH5_Ant1_2480_0~Reference



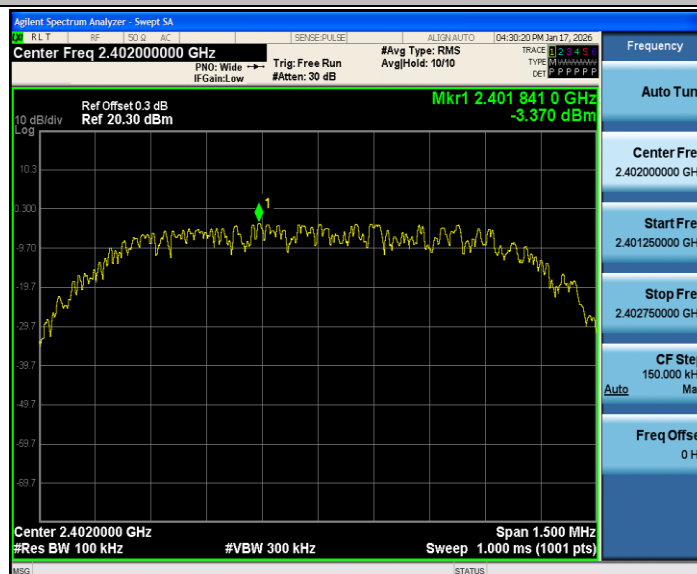
DH5_Ant1_2480_30~1000



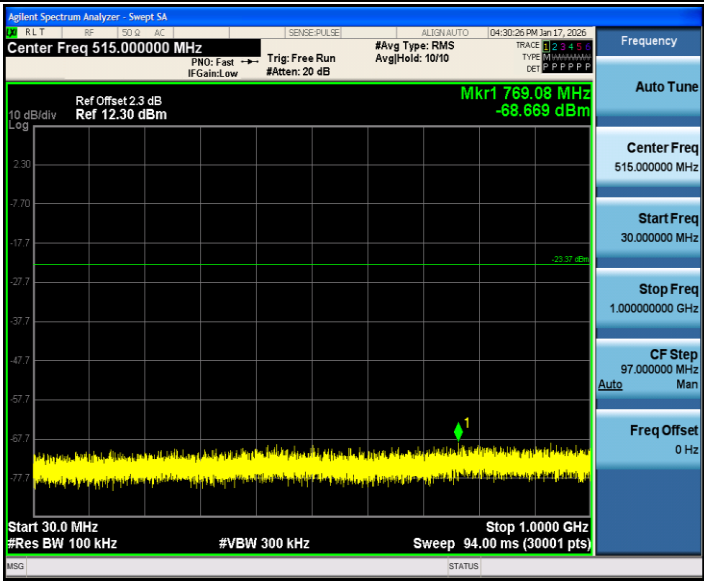
DH5_Ant1_2480_1000~26500



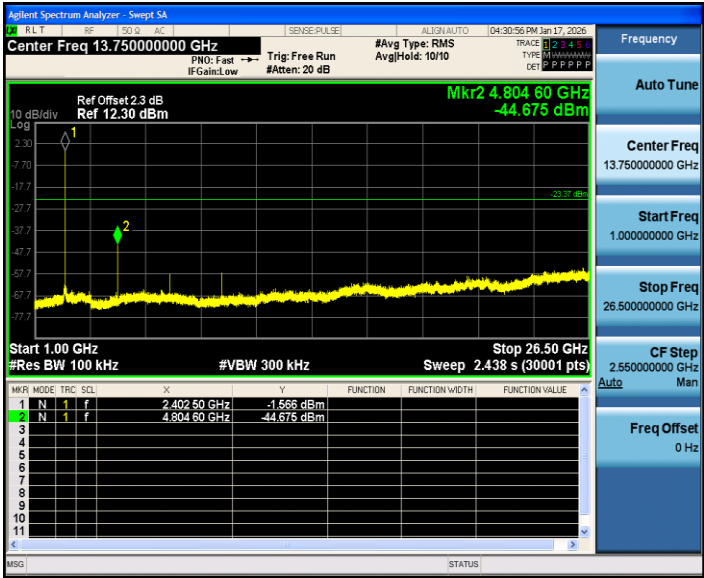
2DH5_Ant1_2402_0~Reference



2DH5_Ant1_2402_30~1000



2DH5_Ant1_2402_1000~26500



2DH5_Ant1_2441_0~Reference